	Туре	L	#	Hits	Search Text	DBs	Time Stamp	Comment s
1	BRS	L1		1136	quantum adj dot\$	USPA T; US-P GPUB; EPO; DERW ENT	2002/10/0 7 11:00	
2	BRS	L2		135	q adj dot\$	USPA T; US-P GPUB ; EPO; DERW ENT	2002/10/0 7 11:01	
3	BRS	L3		748	nanocrystal	USPA T; US-P GPUB ; EPO; DERW ENT	2002/10/0 7 11:01	
4	BRS	L4		7344	test adj strip	USPA T; US-P GPUB ; EPO; DERW ENT	2002/10/0 7 11:01	
5	BRS	L5		565	later adj flow	USPA T; US-P GPUB ; EPO; DERW ENT	2002/10/0 7 11:03	
6	BRS	L6		4	1 and 4	USPA T; US-P GPUB; EPO; DERW ENT	2002/10/0 7 11:07	

	Туре	L#	Hits	Search Text	DBs	Time Stamp	Comment s
7	BRS	L7.	0	1 and 5	USPA T; US-P GPUB; EPO; DERW ENT	2002/10/0 7 11:07	
8	BRS	L8	0	2 and 4	USPA T; US-P GPUB; EPO; DERW ENT	2002/10/0 7 11:07	
9	BRS	<b>L</b> 9	5	3 and 4	USPA T; US-P GPUB; EPO; DERW ENT	2002/10/0 7 11:09	
10	BRS	L10	0	3 and 5	USPA T; US-P GPUB; EPO; DERW ENT	2002/10/0 7 11:09	
11	BRS	L11	365	immunochromatographic	USPA T; US-P GPUB; EPO; DERW ENT	2002/10/0 7 11:09	
12	BRS	L12	54224	chromatographic	USPA T; US-P GPUB ; EPO; DERW ENT	2002/10/0 7 11:10	

	Туре	L #	Hits	Search Text	DBs	Time Stamp	Comment
19	BRS	L19	0	2 and 12	USPA T; US-P GPUB ; EPO; DERW ENT	2002/10/0 7 11:18	
20	BRS	L20	24	3 and 12	USPA T; US-P GPUB; EPO; DERW ENT	2002/10/0 7 11:19	
21	BRS	L21	4	3 same 12	USPA T; US-P GPUB ; EPO; DERW ENT	2002/10/0 7 11:19	

L	Hits	Search Text	DB	Time stamp
Number				
1	1117	quantum adj dot\$	USPAT;	2002/10/07
			US-PGPUB;	12:01
			EPO;	
			DERWENT	
2	1761	nanocrystal\$	USPAT;	2002/10/07
			US-PGPUB;	12:01
			EPO;	
			DERWENT	
3	1025906	substrate	USPAT;	2002/10/07
			US-PGPUB;	12:02
			EPO;	
			DERWENT	
4	· 366	(quantum adj dot\$) same substrate	USPAT;	2002/10/07
			US-PGPUB;	12:03
			EPO;	
			DERWENT	
5	402	nanocrystal\$ same substrate	USPAT;	2002/10/07
			US-PGPUB;	12:03
			EPO;	
			DERWENT	
6	33952	nitrocellulose	USPAT;	2002/10/07
			US-PGPUB;	12:03
		·	EPO;	
	- X -		DERWENT	
7	6	((quantum adj dot\$) same substrate) and	USPAT;	2002/10/07
		nitrocellulose	US-PGPUB;	12:09
			EPO;	
			DERWENT	
8	299206	membrane	USPAT;	2002/10/07
			US-PGPUB;	12:10
			EPO;	
			DERWENT	
9	16	(quantum adj dot\$) same membrane	USPAT;	2002/10/07
			US-PGPUB;	12:10
			EPO;	
			DERWENT	

```
FILE 'CAPLUS, MEDLINE, BIOSIS, CA, SCISEARCH, EMBASE' ENTERED AT 09:50:17
     ON 07 OCT 2002
L1
          32323 S QUANTUM (W) DOT#
L2
          22238 S NANOCRYSTAL#
L3
           5622 S TEST (W) STRIP
              0 S LATER (W) FLOW (W) DEVICE
L4
             45 S LATERAL (W) FLOW (W) DEVICE
L5
        9849346 S 1(S) 3
L6
              0 S L1 (S) L3
L7
              2 S L2 (S) L3
L8
              0 S L1 (S) L5
L9
· L10
              0 S L1 AND L3
L11
              2 S L2 AND L3
```

i, i

```
ANSWER 1 OF 2 CAPLUS COPYRIGHT 2002 ACS
L8
AN
     2001:582161 CAPLUS
DN
     135:134277
     Immunochromatographic test strips with semiconductor nanocrystals as
TI
     detectable labels
     Daniels, Robert H.; Watson, Andrew R.
IN
PΑ
     Quantum Dot Corporation, USA
     PCT Int. Appl., 64 pp.
SO
     CODEN: PIXXD2
DT
     Patent
LA
     English
FAN.CNT 1
     PATENT NO.
                      KIND DATE
                                           APPLICATION NO. DATE
     _____
                            -----
                                           _____
                     A2
     WO 2001057522
                            20010809
                                           WO 2001-US2846
PΙ
                                                             20010129
     WO 2001057522
                      A3
                            20020214
            AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
             CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR,
             HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT,
             LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU,
             SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, UZ, VN, YU,
             ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY,
             DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG
                                          US 2000-750223 20001227
     US 2002004246
                            20020110
                     A1
PRAI US 2000-180811P
                      Р
                            20000207
```

e , , &

US 2000-750223

Α

20001227

L	Hits	Search Text	DB ·	Time stamp
Number				
1	5893	test adj strip	USPAT;	2002/10/07
			US-PGPUB	13:41
2	2367	lateral adj flow	USPAT;	2002/10/07
		_	US-PGPUB	13:45
3	9359	control adj (zone or region)	USPAT;	2002/10/07
		-	US-PGPUB	13:47
4	1440	test adj (zone or region)	USPAT;	2002/10/07
			US-PGPUB	13:47
5	924	sample adj reservoir	USPAT;	2002/10/07
			US-PGPUB	13:48
6	58166	sandwich	USPAT;	2002/10/07
			US-PGPUB	13:48
7	286	(test adj strip) and (control adj (zone	USPAT;	2002/10/07
		or region))	US-PGPUB	13:48
9	1	(sample adj reservoir) and ((test adj	USPAT;	2002/10/07
		(zone or region)) and ((test adj strip)	US-PGPUB	13:48
		and (control adj (zone or region))))		
8	74	(test adj (zone or region)) and ((test	USPAT;	2002/10/07
,		adj strip) and (control adj (zone or	US-PGPUB	14:32
		region)))		
10	6358	sample adj well	USPAT;	2002/10/07
		•	US-PGPUB	14:27
11	7	( ( cobe and ( cobe	USPAT;	2002/10/07
		adj strip) and (control adj (zone or	US-PGPUB	14:27
		region)))) and (sample adj well)		
12	677169	quanti\$	USPAT;	2002/10/07
1			US-PGPUB	·14:33
13	68	((test adj (zone or region)) and ((test	USPAT;	2002/10/07
		adj strip) and (control adj (zone or	US-PGPUB	14:33
		region)))) and quanti\$		

L .	Hits	Search Text	DB	Time stamp
Number				
1	207564	microsphere\$ or bead\$ or microparticle\$	USPAT;	2002/10/08
			US-PGPUB;	09:19
			EPO;	
1			DERWENT	İ
2	1117	quantum adj dot\$	USPAT;	2002/10/08
			US-PGPUB;	09:20
			EPO;	
			DERWENT	
3	751	nanocrystal	USPAT;	2002/10/08
			US-PGPUB;	09:20
			EPO;	
			DERWENT	İ
4	28	(microsphere\$ or bead\$ or microparticle\$)	USPAT;	2002/10/08
		same (quantum adj dot\$)	US-PGPUB;	09:20
			EPO;	
			DERWENT	
5	41	(microsphere\$ or bead\$ or microparticle\$)	USPAT;	2002/10/08
		same nanocrystal	US-PGPUB	09:46

- L7 ANSWER 2 OF 4 CAPLUS COPYRIGHT 2002 ACS DUPLICATE 2
- TI Methods of using semiconductor nanocrystals (quantum dots) as reporters in bead-based multiplex nucleic acid hybridizations
- Methods, compns. and articles of manuf. for assaying a sample for a target AΒ polynucleotide and/or an amplification product therefrom are provided. The methods comprise contacting a sample suspected of contg. the target polynucleotide with a polynucleotide that can bind specifically thereto; this polynucleotide is conjugated to a substrate, preferably an encoded bead conjugate. The beads are encoded with quantum dots. An amplification reaction can first be used to produce the amplification product from the target polynucleotide so that it can be used to indirectly assay for the target polynucleotide. An amplification product detection complex and method of forming the same are also provided. The methods are particularly useful in multiplex settings where a plurality of targets are present. Amplification product assay complexes and amplification product assay arrays are also provided, along with methods of forming the same. Kits comprising reagents for performing such methods are also provided.
- SO PCT Int. Appl., 91 pp. CODEN: PIXXD2
- IN Bruchez, Marcel P., Jr.; Lai, Jennifer H.; Phillips, Vince E.; Watson, Andrew R.; Wong, Edith Y.